Amendments to the Claims:

Claim 1 (currently amended) A balloon having a flexible wall, ~~an intermediate body,~~ proximal and distal cones, proximal and distal ends adapted for being mounted to a catheter, an intermediate body configured to receive a stent thereon, said stent having a proximal end and a distal end, and at least one circumferential groove formed ~~of~~ on the balloon wall ~~adjacent a transition~~ between one of the proximal end and distal end of the stent ~~intermediate body~~ and the respective proximal and distal cone for ~~a cone~~ mechanically disengaging the respective cone from the intermediate body allowing each to move differently in a radial direction wherein said at least one circumferential groove is present when the balloon is in an inflated state and a deflated state.

Claim 2 (original) The balloon of claim 1, wherein the at least one circumferential groove has a shape, in longitudinal cross-section, selected from C-shapes, U-shapes, W-shapes, open-sided polygons, and combinations thereof.

Claim 3 (currently amended) The balloon of claim 1, wherein the at least one circumferential groove is formed adjacent ~~in~~ at least one of the proximal and distal cones such that balloon diameters measured distal and proximal to the at least one circumferential groove are unequal.

Claim 4 (original) The balloon of claim 1, wherein the at least one circumferential groove is at least partially filled with a flexible material that is adhered to the balloon.

Claim 5 (original) The balloon of claim 4, wherein the flexible material comprises foamed material.

Claim 6 (currently amended) A catheter comprising:

an elongate shaft having a lumen there through; and

a balloon mounted about a distal region of the shaft and being in fluid communication with the lumen, the balloon having a flexible wall, an intermediate body for receiving a stent thereon, the stent having proximal and distal ends, proximal and distal cones, proximal and distal ends attached to the shaft, proximal and distal transitions between the proximal and distal ends of the stent ~~intermediate body~~ and the proximal and distal cones, respectively, and a distal circumferential groove formed ~~of~~ on the balloon wall adjacent the distal transition, the distal circumferential groove mechanically disengaging the distal cone from the intermediate body allowing each to move differently in a radial direction wherein said distal circumferential groove is present when said balloon is in an inflated state and a deflated state.

Claim 7 (currently amended) The catheter of claim 6 further comprising a proximal circumferential groove formed ~~of~~ on the balloon wall adjacent the proximal transition.

Claim 8 (currently amended) The catheter of claim 7, wherein the balloon is capable of being partially inflated ~~deflated~~ around the shaft such that the proximal and distal cones each have partially inflated ~~deflated~~ profiles that are larger than a deflated profile of the intermediate body.

Claim 9 (currently amended) The catheter of claim 8, wherein during balloon inflation ~~deflation~~, the proximal and distal circumferential grooves form proximal and distal steps in diameter, respectively, between the deflated profile of the intermediate body and the partially inflated ~~deflated~~ profiles of the proximal and distal cones.

Claim 10 (currently amended) A stent delivery catheter comprising:

an elongate shaft having a lumen there through;

a balloon mounted about a distal region of the shaft and being in fluid communication with the lumen, the balloon having a flexible wall, an intermediate body, proximal and distal cones, and proximal and distal ends attached to the shaft[,];

a balloon expandable stent mounted about said intermediate body having proximal and distal ends; and

a first circumferential groove formed ~~of~~ on the balloon wall adjacent a transition between one of the proximal and distal ends of the stent ~~intermediate body~~ and a respective one of the proximal and distal cones such that the first circumferential groove mechanically disengages the one of the respective proximal and distal cones from the respective proximal and distal ends of the stent allowing each to move differently in a radial direction, wherein said first circumferential groove is present when the balloon is in an inflated state and a deflated state~~; and~~

~~a balloon expandable stent mounted about the intermediate body of the balloon~~.

Claim 11 (currently amended) The stent delivery catheter of claim 10 further comprising a second circumferential groove formed of the balloon wall adjacent a transition between the other of the proximal and distal ends of the stent ~~intermediate body~~ and the other of the proximal and distal cones.

Claim 12 (original) The stent delivery catheter of claim 10, wherein the first circumferential groove is at least partially filled with a flexible material that is adhered to the balloon.

Claim 13 (currently amended) The stent delivery catheter of claim 12, wherein ~~when the balloon is deflated,~~ the flexible material forms a first dam to help retain the stent on the balloon.

Claim 14 (currently amended) The stent delivery catheter of claim 11, wherein, when the balloon is deflated, the proximal and distal cones each have partially inflated ~~deflated~~ profiles that are larger than a deflated profile of the intermediate body such that the proximal and distal cones form proximal and distal dams, respectively, to ~~help~~ retain the stent on the ~~deflated~~ balloon.

Claim 15 (currently amended) A method of making a stent delivery catheter comprising:

providing a catheter having an elongate shaft with a lumen there through;

mounting a balloon about a distal region of the shaft and in fluid communication with the lumen, the balloon having a flexible wall, an intermediate body for receiving a stent thereon, proximal and distal cones, and proximal and distal ends attached to the catheter shaft[[,]] ; ~~and~~

forming at least one circumferential groove ~~formed of~~ on the balloon wall adjacent a transition between the intermediate body and one of the proximal and distal cones, the at least one circumferential groove mechanically disengaging the one of the proximal and distal cones from the intermediate body allowing each to move differently in a radial direction wherein said at least one circumferential groove is present when the balloon is in an inflated state and a deflated state;

collapsing the balloon around the catheter shaft; and

mounting a balloon expandable stent in a radially compressed configuration around the intermediate body of the balloon.

Claim 16 (currently amended) The method of claim 15, wherein mounting the stent further comprises holding the stent in the radially compressed configuration while inflating the proximal and distal cones to create dams ~~that help~~ to retain the stent on the balloon.

Claim 17 (original) The method of claim 16 further comprising:

heat setting the balloon to produce a shape memory therein of the dams formed in the proximal and distal cones.

Claim 18 (original) The method of claim 15 further comprising:

at least partially filling the at least one circumferential groove with a flexible material that is adhered to the balloon.

Claim 19 (new) The balloon of claim 1 further comprising at least a second circumferential groove formed in the balloon wall between the other of the proximal end and distal end of the stent and the other of said proximal and distal cone for mechanically disengaging the other cone from the intermediate body.

Claim 20 (new) The method of claim 15 wherein the step of forming is performed prior to the step of mounting.